Approved Minutes of the Technical Advisory Committee Meeting
November 24, 2009

Attendees:	Roger Thompson	Craig Heindel
	Spencer Harris	Steve Revell
	Gail Center	Kim Greenwood
	Rodney Pingree	Gerry Kittle
	Gary Adams	Claude Chevalier
	Amy Macrellis	Anne Whiteley
	Scott Stewart	John Beauchamp

Scheduled meetings:

December 8, 2009	1 – 4 PM	Room 107 Stanley Hall
January 12, 2010	1 – 4 PM	Room 100 Stanley Hall
February 9, 2010	1 – 4 PM	Room 107 Stanley Hall

Review of minutes

The draft minutes for the September 16, 2008 meeting were reviewed. Rodney asked to clarify that his question related to regulating treatment systems for primary standards was only based on the group's decision to not regulate pathogens, as he continues to disagree with the deregulation of treatment systems for pathogens.

TAC Annual Report

Roger briefly reviewed the statutory change made in the past legislative session to re-establish the requirement for an annual report from the TAC. Craig agreed to write the portion summarizing the actions of the TAC for 2008 and 2009. Roger will update the various tables on permits, applications, innovative systems, etc.

Water Treatment Systems

Anne started with a review of past actions by the TAC and by Commissioners Pelosi and Johnson. Anne stated that the TAC had reached uniform agreement that treatment systems for water softening and secondary should be deregulated. Anne recalled that there was a lot of discussion about regulating systems that treat pathogens with Gail Center giving the history of people contacting the Health Department for advice. Gary Adams and John Beauchamp explained what they, and other water treatment specialists, have done with systems designed to treat water to protect against pathogens. Anne recalls that there was near universal support from TAC for deregulation of systems treating for pathogens that serve individual single family residences with the group more divided on treatment systems serving other non-public water systems. Anne reviewed the discussions related to whether or not there are licenses or certifications other than the professional engineering license that could be relied upon to establish

competency of those designing water treatment systems. The certifications from the Water Quality Association were reviewed in some detail, which resulted in concerns about the cost to obtain and maintain the license and the availability of local training and testing sessions. The Vermont Plumbing Specialty License for the installation of water treatment systems was reviewed and while the license assures the plumbing connections are made by knowledgeable people the training does not cover how to choose the proper treatment system or how to evaluate whether improvements to the water system outside of the building should be part of the solution. The TAC also spent time at a couple of meetings reviewing a checklist approach that would require a designer to evaluate the location and construction of the source along with interior plumbing construction. This was not pursued to conclusion as people realized it would require a lot of work to anticipate all of the situations which would occur and to design the checklist to cover each possibility.

Anne then summarized staff meetings with Commissioner Laura Pelosi during 2008. Commissioner Pelosi tentatively decided to support revising the Wastewater System and Potable Water Supply Rules (Rules) to deregulate water treatment systems designed to deal with hardness, secondary contaminants, and pathogens for all non-public water systems. Anne stated that when this was discussed with TAC there was a strong majority of TAC members supporting the deregulation of all non-public systems for pathogen treatment. The Commissioner's Office did not push this issue during the fall of 2008 and the spring of 2009 as the budget shortfalls and other issues consumed the legislative session. Recently, Commissioner Justin Johnson directed Anne to begin work on draft language revising the Rules relative to water treatment systems. Commissioner Johnson is currently taking the same position as Commissioner Pelosi to deregulate treatment systems for softening, secondary standards, and pathogens for all non-public standards. No Rule changes are proposed for treatment systems for primary standards. Anne noted that the TAC has only had limited discussions on treat for primary standards.

Anne said that all of this history had led to the handout with draft language to revise the Rules relative to treatment systems. Anne also reviewed her recent attendance at the Ground Water Coordinating Committee (GWCC) which also agreed with deregulation of water treatments systems for softening and secondary standards. Also discussed at this meeting was the fact that some contaminants have both secondary and primary standard limits. This means that at lower levels of contamination there are aesthetic concerns while at higher contamination levels there are health concerns.

Spencer asked if the proposed changes mean that all wells will need to be tested for contaminants. Anne said no, that only if a well has been tested and determined to not meet the standards is it considered failed. Roger said that per the current rules, water supplies serving only one single family residences still only need to be tested if there is a reason to believe the water might be contaminated. Anne noted that banks and buyer's attorneys are starting to ask for testing in many cases. Anne said that realtors and bankers have told her they ask for the full suite of testing not just for coliform. It was noted that some purchase and sale agreements now allow the purchaser to back out of the deal if the water supply is contaminated. Gary said that some home inspectors are routinely testing

for a wide range of contaminants. Craig asked if a system must be listed on the Agency website in order for it to be considered to be failed. Anne responded that if any of the five contaminants listed in statute and Rules in the definition of "failed supply" (arsenic, nitrate, nitrite, coliform, or uranium) exceeds standards the supply is considered failed. If other contaminants exceeding standards are found, or if the volume or flow of water is found to be inadequate for the permitted use, the system is only considered failed if the system is listed on the Agency website. No systems have been listed to date.

> Note: The Wastewater System and Potable Water Supply Rules include three categories of failed water supplies. The first is any water system that is tested for arsenic, nitrate, nitrite, coliform, and uranium with any of these exceeding the drinking water standard. The second is any system that the Secretary affirmatively determines to not be potable and that information has been posted on the Agency website (none have been posted to date). The third is any system that the Secretary affirmatively determines is providing an insufficient quantity of water to support the usual and customary uses of a building or structure and that information has been posted on the Agency website (none have been posted to date).

Gail noted that Rhode Island requires testing of all water systems at the time of sale. Anne reviewed the time of sale discussions that occurred in 2006 with bankers, realtors, and others where there was initial interest in establishing requirements for time of sale inspections. After much discussion it appeared that a complete time of sale inspection could cost several hundred to a few thousand dollars so the proposal was not supported by the Agency. Roger noted that legislation was proposed a few years ago and supported by the Department of health to require routine water testing for rental properties which failed to get legislative support.

Kim said she had some concerns about extensive deregulation and asked if some sort of general permit process might be appropriate. Anne said that we do not have general permits in the Wastewater System and Potable Water Supply Rules and are not planning to use them because so many of the design issues are extremely site specific.

Anne then reviewed the draft rule revision language in the 11/24/2009 draft. As drafted a permit is not needed to install or operate a water treatment system for any non-public water system to treat for:

A. hardness,

B. secondary standards unless the constituent also has a primary standard, and/or

C. pathogens, provided the system treats all of the water used for drinking, washing, bathing, the preparation of food, and laundering

Anne expressed concerns about enforcing section B as the constituents that have or are expected to soon have both a primary and secondary standard (copper, fluoride, manganese) all have the secondary standard set at a lower concentration than the primary standard.

The draft language also includes an exemption for the disposal of the filter backwash into an existing wastewater system.

Rodney asked if the intent of the language was to require a whole house treatment system when treating for pathogens as opposed to a point of use system that might only serve the kitchen sink. Anne replied that the language is intended to require all of the water that is defined as being potable in the Rules be treated because people brush their teeth in the bathroom, may consume water in the shower, etc. Roger supported the concept of treating the whole house system. Anne asked for a vote on whether the whole house system should be required. Kim said she was concerned that the Agency would not enforce a whole house requirement. Gary noted that some attorneys and clients are holding out for a new well when there are pathogens in the system. Craig said he supported the whole house approach because it is the best option but that a strong outreach program explaining our reasoning is also needed. Roger suggested adding a section that would exempt treatment systems for copper, fluoride, and manganese. TAC on a majority vote decided to revise the exemption to state that when treating for a constituent with a secondary standard a permit is not required even if the water source includes a contaminant that exceeds the primary standards.

Gail asked why the proposed language for exemption #24 included a statement that the discharge could not include uranium in excess of the standard developed by the Health Department. This was included because there are limitations for discharge of radioactive waste in the Underground Injection Control Rules that are based on federal standards. TAC supported dropping the limitation from the draft language. Kim said that she could not agree to this approach at this time.

Gary noted that uranium bonds strongly to resin so a non-discharging treatment approach could be used.

Gail asked if the use of aerated treatment systems such as for treating radon gas, hydrogen sulfide gas, and/or manganese would be regulated. Roger said it would depend. These contaminants would only be regulated under the current proposal if intended to treat for parameters which exceed their primary standards. Gail noted that neither radon gas nor hydrogen sulfide gas have primary standards.

Steve asked if this means that all systems for primary standards will require permits. Anne replied that they would need permits. Steve then asked if remediation systems, such as the Sites Management Section routinely approved, need permits. Anne said that under the current rules they do need permits. Anne said she would discuss this with the Sites Management Section. Roger suggested this might be the one place where a

general permit would work with the main requirement being that the system is managed by the Sites Management Section.

John asked about the status of a system that was installed years ago for water softening but in recent testing it is determined that the water also exceeds the primary standards for radionuclides. This system would be regulated.

Anne suggested she might write a site remediation exemption. This concept is supported by the TAC.

Claude asked if there is a schedule for the Rule revisions. Anne said her sense is that the Commissioner wants to move fast and limit the changes to those related to water treatment systems. The process takes about 4 ½ months from the time it starts.

Steve said that he is concerned that this is a special effort related to water treatment issues and once resolved the TAC will stop meeting again. Anne said that this would not happen, because, in addition to other issues, the Water Supply Rules are being revised and TAC review is important for their completion.

Water Supply Rules

Scott did a quick status update on the revisions to the Water Supply Rules. Anne suggested that the subcommittee meet to deal with Scott's draft of changes for springs and shallow water sources. Scott also reviewed the draft changes to the design flows. These mostly reflect the inclusion of a 10% reduction in design flow based on an assumption that at this point most interior plumbing systems include standard low flow devices. Steve suggested that a new category should be added for deli operations.

Steve also noted that Spencer would like to have more input in setting the meeting agenda as there are topics on the list that have been waiting for a long time.

Meeting Dates

Future meetings were scheduled for December 8th, January 12th, and February 9th all being from 1 – 4 PM. Roger will arrange for meeting rooms.

Items prioritized for discussion with high, low, and medium ranking

1. Soil identification vs. perc test **medium**
2. Curtain drain with presumption of effectiveness **high**
3. Revisions to desktop hydro chart **medium**
4. Minimum amount of sand under a mound **high**
5. Grandfathered design flow and conversion of use policy **high**
6. Updating of design flow chart **high**

Executive Committee

John Forcier, Steve Revell, Lance Phelps, Phil Dechert, and Roger Thompson
Alternates – Chris Thompson, Spencer Harris, Jeff Williams

Subcommittees

Hydrogeology - Craig Heindel, Dave Cotton and Steve Revell.

Training subcommittee - John Forcier, Roger Thompson, , Dave Cotton, and Barbara Willis.

Drip Disposal – Roger Thompson, Dave Cotton, Steve Revell, Alan Huizenga

Water treatment systems – Gail Center, Jeff Williams, Rodney Pingree, Dave Cotton, Lance Phelps, and Roger Thompson.